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EXAMINER

HOFFLER, RAHEEM

ART UNIT

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PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/824,961	Applicant(s) MINIUM ET AL.	
	Examiner RAHEEM HOFFLER	Art Unit 2165	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 02 November 2009.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,5-8,16,19-22,28,30,33 and 35-41 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,5-8,16,19-22,28,30,33 & 35-41 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

Detailed Action

Response to Amendment

The Office action has been issued in response to amendment filed 2 November 2009. Claims 1, 5-8, 16, 19-22, 28, 30, 33 & 35-41 are pending.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1, 5-8, 16, 20, 21, 28, 30, 33 & 35-41 are rejected under 35 U.S.C. 103(a) as being unpatentable over Meik et al (USPG Pub No. 20050108200A1; Meik hereinafter) in view of Gargi et al (USPG-Pub No. 20050027712A1; Gargi hereinafter) further in view of Do et al (USPG-Pub No. 20020170042A1; Do hereinafter) yet further in view of Rowen et al (USPG Pub No. 20070174113A1; Rowen hereinafter).

As for Claim 16, Meik teaches, A method implemented within a computing system that includes a processor and memory storing instructions which, when

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executed by the processor, implement the method for managing classifying information in a centrally managed common classification structure, the method comprising:

“instantiating the common classification structure for the taxonomy based at least on the structure type” (see Fig. 1 & 4; (see paragraph [0155-0160], [0167-0181], [0186-0190]; e.g., whereas the cohesion of the plurality of modules that perform the tasks of classification and categorization of information at the users request, as well as the utilization of customized user interfaces allowing for the ease of use in order to locate a desired result while interacting with numerous software applications, is equivalent to Applicant’s teachings of providing a cohesive user experience through the inclusion of unrelated software design tools)

“maintaining the common classification structure to facilitate interaction with taxonomy artifacts by the plurality of unrelated software design tools” (see paragraph [0155-0160], [0167-0185]; e.g., filtering module);

Meik does not appear to explicitly recite the limitation of, “receiving user input related to at least one taxonomy associated with a common classification structure that includes a plurality of nodes, wherein the common classification structure is based on a structure type that describes a pattern to which instances of the plurality of nodes should conform, the structure type comprising: one or more node types, each node type defining a type of artifact that may be included in the common classification structure;

a structure type class that describes how the plurality of nodes that correspond to the one or more node types may be assembled into a hierarchy, wherein the structure type class holds a name of the structure type and identifies that the common

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classification structure associated with the taxonomy is a hierarchy and structural constraints that define permissible parent-child relationships between the one or more node types”;

Gargi appears to explicitly recite the limitation of, “receiving user input related to at least one taxonomy associated with a common classification structure that includes a plurality of nodes, wherein the common classification structure is based on a structure type that describes a pattern to which instances of the plurality of nodes should conform, the structure type comprising: one or more node types, each node type defining a type of artifact that may be included in the common classification structure(see paragraph [0077-0078], [0106-0108]; e.g., various node types);

a structure type class that describes how the plurality of nodes that correspond to the one or more node types may be assembled into a hierarchy, wherein the structure type class holds a name of the structure type and identifies that the common classification structure associated with the taxonomy is a hierarchy and structural constraints that define permissible parent-child relationships between the one or more node types” (see paragraph [0012], [0072-0076], [0080-0084]; whereas Gargi et al teaching of clusters, meta data and hierarchy is equivalent to Applicant’s teaching of hierarchy, class and constraints);(see Fig. 15; e.g., object types; (see paragraph [0096][0105][0113]));

The missing of both Meik and Gargi are the limitations of, “wherein each of the design tools controls at least one of the taxonomy artifacts” and “exposing the common classification structure among a plurality of unrelated software design tools as one or

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more typed XML (Extensible Markup Language) documents, wherein an XML representation of each node is typed according to the name of the structure type”

Do appears to explicitly recite the limitation, “wherein each of the design tools controls at least one of the taxonomy artifacts” (see Abstract; see paragraph [0074], [0108], [0145], [0148]; e.g., Axiomatic design tools that interact with software components and manipulate objects into a desired shape or format. They allow a user to populate an axiomatic design equation to determine coupling between elements of a previously developed software system)

“exposing the common classification structure among a plurality of unrelated software design tools as one or more typed XML (Extensible Markup Language) documents, wherein an XML representation of each node is typed according to the name of the structure type” (see paragraph [0075], [0120]; e.g., XML documents).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have combined the controlling and manipulation of software components by software design tools as taught by Do with classification based interactive system for information retrieval as taught by Meik with the organizing a collection of objects as taught by Gargi et al in order to improve the precision of searching, thereby minimizing browse time and false hits without suffering a corresponding reduction in the relevant document recall rate (see Meik; paragraph [0079]).

Meik, Gargi and Do do not appear to explicitly recite the limitation of, “monitoring the common classification structure to detect manipulations of the common

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classification structure; providing automatic notifications to one or more users upon receiving input manipulating the common classification structure; receiving user feedback in response to the notifications, the user feedback indicating that the manipulation of the common classification structure is allowed; allowing the manipulation of the common classification structure based on the user feedback; and informing the one or more users of the manipulation to the common classification structure.”

The reference of Rowen appears to explicitly recite the limitations of, “monitoring the common classification structure to detect manipulations of the common classification structure” (see paragraph [0030-0032]; e.g., changes detected are recognized by a data modification engine that flags changes as “pending approval”);

“providing automatic notifications to one or more users upon receiving input manipulating the common classification structure” (see paragraph [0033-0034]; e.g., a notification engine that notifies users of modifications to objects);

“receiving user feedback in response to the notifications, the user feedback indicating that the manipulation of the common classification structure is allowed” (see paragraph [0020], [0035], [0041-0046]; e.g., Output interface is a display responsive to the processing device. Receiving responses to requests/notifications; modifications may be approved or denied by business objects within the hierarchical structure that has received notification of changes that were made);

“allowing the manipulation of the common classification structure based on the user feedback; and informing the one or more users of the manipulation to the common classification structure” (see paragraph [0042-0046]; e.g., modifications may be approved or denied by business objects within the hierarchical structure that has received notification of changes that were made)

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have combined the process response step as taught by Rowen with the methods of Do, Gargi and Meik in order to make changes to plans and approving changes to distributions beyond those generated from the plans in an efficient and controlled manner. (Rowen; paragraph [0005])

As for Claim1, Meik et al teaches of, “A computer implemented system comprising a processor and one or more physical computer readable storage media operatively coupled to the processor, the computer readable storage media having stored thereon computer executable instructions that, when executed by the processor, implement the method of claim 16” (see paragraph [0083], [0097] [0125], [0145]; e.g., query processor coupled to storage media)

As for Claim 5, Meik et al teaches of the use of a hierarchical structure consisting of object types, a graphical user interface, a plurality of software components as well as

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a plurality of unrelated software design tools in interacting for the purpose of classification and categorization of information.

Gargi et al teaches of organizing a collection of objects through classification nodes, and a segmentation engine (e.g., taxonomy engine). Both Gargi et al and Meik et al fail to explicitly teach of a globally unique identifier (GUID) being incorporated into his art. Omoigui et al teaches of a globally unique identifier (see paragraph [0982]).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have combined a globally unique identifier as taught by Omoigui et al with the organizing a collection of objects as taught by Gargi et al because it is a preferable file naming method, as made hackneyed in the state of the art. (Omoigui et al (USPG-Pub No. 20030126136A1); see paragraph [0982]).

As for Claim 6, Meik et al clearly teaches a graphical user interface employable by a user to associate at least one of the plurality of nodes to at least one of the unrelated software design tools (see paragraph [0186-0190], [0214]; e.g., GUI).

As for Claim 7, Gargi et al clearly teaches the graphical user interface enables a user drags and drop a displayed representation of the at least one software design tool onto a displayed representation of at least one of the plurality of nodes to assign the at least one software component to the node.” (see Fig. 2 (164) e.g., layout engine; see paragraph [0085]).

As for Claim 8, Meik et al teaches of a plurality of software design tools as well as a plurality of unrelated software design tools in interacting for the purpose of classification and categorization of information. Gargi et al teaches of the classification component utilizing statistical analysis related to artificial intelligence to couple software design tools to the common classification structure (see Fig. 17 (120); e.g., Business Process Cockpit; (see paragraph [0043][0110][0112] and [0114])).

Both Gargi et al and Meik et al fails to explicitly recite the limitation of heuristics.

Omoigui et al teaches heuristics to couple software design tools to a common structure (see paragraph [0622][1048]).

As for Claim 20, Meik teaches, “a graphical user interface to the users for generating the taxonomy” (see paragraph [0186-0190], [0214]; e.g., GUI).

As for Claim 21, Gargi teaches, “facilitating association of the taxonomy artifacts to respective node types by receiving an indication of a drag and drop of at least one of the taxonomy artifacts into respective node type” (see Fig. 2 (164) e.g., layout engine; see paragraph [0085]).

Claim 28 differs from Claim 16 in that Claim 28 is a method with Claim 30 as a dependency, whereas Claim 16 is a method as well with Claims 1, 5-8, 19-22, 33 & 35-

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41 as dependencies. Thus, Claim 28 is analyzed as previously discussed with respect to Claim 16 above.

As for Claim 30, Meik et al clearly teaches, “the common structure is exposed *via* a graphical user interface” (see paragraph [0186-0190], [0214]; e.g., GUI).

As for Claim 33, Do teaches, “receiving user input regarding a node within the common classification structure via the graphical user interface” (see paragraph [0105-0108]).

As for Claim 35, Gargi teaches, “wherein the node types comprise: a division node type, a group node type, a team node type, and a person node type” (see paragraph [0077-0078], [0106-0108]).

As for Claim 36, Gargi teaches, “wherein the structure type class specifies that top nodes in the hierarchy are division node types” (see paragraph [0077-0078], [0106-0108]).

As for Claim 37, Gargi teaches, “wherein the node types hold a CandidateRoot attribute indicating that nodes corresponding to that type may be top-level nodes in the hierarchy, and a CandidateLeaves attribute indicating that nodes corresponding to that type may be lowest-level nodes in the hierarchy” (see paragraph [0077-0078], [0106-0108]).

As for Claim 38, Meik teaches, “the graphical user interface is an end-user graphical user interface that provides a left pane that displays a graphical representation of the common classification structure as a tree that indicates parent/child relationships of the plurality of nodes using indentation and that provides a user interface control providing user-selection of a node within the graphical representation, and that provides a right pane that displays properties associated with the selected node and that provides a user interface control permitting modification of the displayed properties” (see paragraph [0065-0066], [0186-0190], [0214]; e.g., GUI).

As for Claim 39, Meik teaches, “wherein the end-user graphical user interface displays only those nodes that an end-user has permission to view” (see paragraph [0186-0190], [0214]; e.g., GUI).

As for Claim 40, Gargi teaches, “wherein the node types hold the structural constraints, including a mayBeParentOf constraint indicating node types a particular node may be a parent of, and a mayBeChildOf constraint indicating node types a particular node may be a child of” (see paragraph [0072-0077], [0080-0084]).

As for Claim 41, Meik teaches, “A computer readable storage medium having stored thereon computer executable instructions that, when executed by a processor, perform the method of claim 16” (see paragraph [0083], [0097] [0125], [0145]; e.g., query processor coupled to storage media)

Claims 19 and 22 are rejected under 35 U.S.C. 103(a) as being unpatentable over Meik et al (USPG Pub No. 20050108200A1; Meik hereinafter) in view of Gargi et al (USPG-Pub No. 20050027712A1) further in view of Do et al (USPG-Pub No. 20020170042A1; Do hereinafter) yet further in view of Rowen et al (USPG Pub No. 20070174113A1; Rowen hereinafter) even further in view of Omoigui et al (USPG-Pub No. 20030126136A1).

As for Claim 19, Meik et al teaches of a plurality of software components as well as a plurality of unrelated software design tools in interacting for the purpose of classification and categorization of information. Gargi et al teaches of node (e.g., classification nodes; see paragraph [0106][0107]) in a common classification structure

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(e.g., object cluster or group; see paragraph [0049]). Do teaches of the controlling and manipulation of software components by software design tools. Rowen teaches of the process response step.

Gargi, Meik, Do and Rowen all do not appear to explicitly recite the integration of a globally unique identifier (GUID).

Omoigui appears to explicitly recite the limitation of a globally unique node identifier (see paragraph [0982]).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have combined a globally unique identifier as taught by Omoigui et al with the methods of Rowen, Do, Meik & Gargi because it is a preferable file naming method, as made hackneyed in the state of the art. (Omoigui et al (USPG-Pub No. 20030126136A1); see paragraph [0982]).

As for Claim 22, Omoigui teaches, “employing heuristics and statistical analyses related to artificial intelligence” (see paragraph [0622][1048]).

Response to Arguments

Applicant’s arguments with respect to Claims 1, 3-13, 16, 19-22, 28, 30 & 33 have been fully considered but are not persuasive.

“With respect to Applicant argument that, “*Meik* fails to disclose or suggest, among other things, *a common classification structure that includes a plurality of nodes that is based upon a structure type that describes a pattern to which instances of the plurality of nodes should conform, and wherein the structure type comprises node types, a structure type class, and structural constraints*, as recited by claims 16 and 28 and particularly when considered in combination with the other limitations of claims 16 and 28. Furthermore, *Meik* fails to disclose or suggest, among other things, *exposing the common classification structure among a plurality of unrelated software design tools as XML documents, as well as the notification/feedback mechanism recited by claims 16 and 28. To illustrate, the "simultaneously designed" and "central" modules of Meik fail to disclose or suggest, among other things, a plurality of unrelated software design tools.*”

“...Such a recitation fails to disclose or suggest, among other things, a structure type class that describes how the plurality of nodes..., may be assembled into a hierarchy [and that] holds a name of the structure type, or structural constraints that define permissible parent-child relationships between..., node types (see claims 16 and 28, for example)...In addition to failing at least to overcome the foregoing deficiencies of *Meik* and *Gargi, Do* also fails to disclose or suggest wherein an XML representation of each node is typed according to the name of the structure type (see claims 16 and 28, for example).”

Examiner is not persuaded and contents that the combined references of *Meik*, *Gargi, Do*, *Rowen* and *Omoigui* appear to explicitly recite Applicant’s limitations. The reference of *Meik* introduces the teachings of extracting text from one or more of a

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plurality of documents having a common or varying structure type and placing them within a filtering process in order to make it possible to determine the specific type of document. [0155-0160]. As discussed above, the cohesion of the plurality of modules that perform the tasks of classification and categorization of information at the users request, as well as the utilization of customized user interfaces allowing for the ease of use in order to locate a desired result while interacting with numerous software applications, is equivalent to Applicant's teachings of providing a cohesive user experience through the inclusion of unrelated software design tools [0167-0180]. The reference of Gargi was combined in order to combine its teaching of adding metadata to one or more objects or nodes, which would exemplify that objects hierarchical order [0077-0078]. The metadata was also assigned to label the nodes of various types, such as work nodes or route nodes [0106-0108]. The reference of Do explicitly recites Axiomatic design tools that interact with software components and manipulate objects into a desired shape or format. They allow a user to populate an axiomatic design equation to determine coupling between elements of a previously developed software system [0145], [0148]. Examiner maintains rejection.

Conclusion

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to RAHEEM HOFFLER whose telephone number is (571)270-1036. The examiner can normally be reached on Tuesday-Friday, 10:00 a.m. - 6:30 p.m..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Neveen Abel-Jalil can be reached on (571) 272-4074. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/R. H./

Examiner, Art Unit 2165

/Neveen Abel-Jalil/

Supervisory Patent Examiner, Art Unit 2165